interfaces, data transformation rule sets and scripts executed by the script processor.

A5 concl Claim 20 (New)

A computer readable memory as claimed in claim 18 further comprising a script control language used by the script processor to control data transformation within said system interface and movement of said data into and out of said distribution system.

REMARKS

Reconsideration of this application is respectfully requested.

The Examiner rejected claims 1-18 of this application under 35 USC 103(a) as being unpatentable over Morgenstern (5,970,490) in view of Mitchell et al (5,497,491).

Claim 1 is cancelled without prejudice. The rejection of claim 1 is thereby traversed.

Claim 18 is amended to claim a computer readable memory for transforming and exchanging datastore data between heterogeneous computer systems using different datastore formats for storing similar information, comprising executable code for providing the functionality of a distribution system. The distribution system includes a systems interface, a script processor and a rule set processor. A distribution system of this type is neither taught nor suggested by any combination of Morgenstern or Mitchell et al.

The teachings of Mitchell et al are described in the background of the

20

invention of the instant application. Morgenstern teaches a generation module 30 which outputs a compiled information mediator/bridge 60 adapted to convert data from a source format to data of a target format. Applicants acknowledge that the end result of the integration platform for heterogeneous databases taught by Morgenstern is equivalent to the end result achieved by the instant invention. Nonetheless, the methodology taught by Morgenstern teaches directly away from the claimed invention. Morgenstern's compiled information mediator/bridge 60 is inflexible and adapted for single instance applications. If either the source or the target database structures are modified, the entire process must be re-executed and a new information mediator/bridge 60 compiled.

In contrast, as noted above the invention claimed in claim 18 defines executable code for providing a distribution system that uses a script processor which utilizes metadata stored in a metadata database to interpretively convert data from a source to a target format using data bags for temporarily storing the data during the conversion process. No combination of Mitchell et al and Morgenstern teaches or suggests such a system.

With respect to claim 2, the Examiner assets that Morgenstern teaches logical import and export data interfaces; a script processor (i.e. browser) for controlling data transformation within the interface and movement of data into and out of the distribution system. With all due respect, the reference by Morgenstern to the browser (column 5, lines 49-60) is completely unrelated to the script processor of the instant invention. Morgenstern uses a browser to "view and browse the combined uniform schema 11 and data obtained from multiple data sources 2, 4, and 6" (column 5, lines 51-53). Morgenstern's browser is therefore used as a query tool and



serves no function in data conversion. In stark contrast, applicants' script processor plays the key role in the conversion and uses the metadata database associated with a conversion to convert data by executing scripts stored in the metadata database. The Examiner acknowledges that Morgenstern does not teach a metadata database. The Examiner asserts that it would have been obvious to incorporate the teachings of Mitchell et al to arrive at the claimed invention. With all due respect, no combination of Morgenstern with Mitchell et al leads one of skill in the art to the claimed invention, because neither reference discloses a method or apparatus similar to that claimed in amended claim 2. Neither reference includes any mention or suggestion of scripts or a script processor. Neither reference mentions or suggests a rule set processor responsive to the script processor for manipulating a data bag for storing imported data, and a data bag for storing export data. In fact, neither Morgenstern nor Mitchell et al require tools for manipulating data bags because they move data directly from the source to the target databases. The rejection of claim 2 is thereby traversed.

Regarding claim 14, the Examiner asserts that Morgenstern teaches loading data, sorting, merging, appending, copying, joining, formatting and saving for the purposes of transforming data in column 7, lines 40-49. Applicants fail to understand how the Examiner draws this conclusion. No reference in Morgenstern can be found to any of sorting, merging, appending, copying or joining data. Morgenstern teaches conversion from a single source to a single target. There is no teaching that the information mediator/bridge 60 is adapted to sort, merge, append, copy or join data from different sources.

Claim 14 is amended to claim the operating of a script processor that

utilizes metadata stored in a metadata database to control the loading of data into an import data bag from a logical import data interface and performing one or more of the sorting, merging, appending, copying, joining and formatting functions. This flexibility during the conversion of data is neither taught nor suggested by either of the cited references. The rejection of claim 14 is thereby traversed.

The Examiner asserts that the limitations of claims 3-13 and 15-17 were noted in the rejection of claims 1, 2, 14 and 18.

The Examiner should note that claim 3 claims an interface to create data transformation rule sets and scripts. Neither Morgenstern nor Mitchell et al teach or suggest the creation of scripts or make any reference to scripts. Nor does either reference teach an interface to enable the creation of data transformation rule sets. The rejection of claim 3 is thereby traversed.

Claims 4 through 9 further define subject matter claimed in claim 3. The rejection of claims 4 through 9 is thereby traversed.

Claim 10 further defines the rule processor claimed in claim 2. Neither Morgenstern nor Mitchell et al teach or suggest a rule processor. The rejection of claim 10 is thereby traversed.

Claim 11 claims a script control language for controlling data transformation within a system interface and movement of data into and out of the distribution system. Neither Mitchell et al nor Morgenstern teach or suggest the use of scripts for data conversion, much less the use of a script control language for controlling data transformation within the system interface. The rejection of claim 11 is thereby traversed.

Claim 12 further defines the script control language. The rejection of



claim 12 is thereby traversed.

Claim 13 further defines script commands of the script control language. Neither reference teaches, suggests or refers to script commands. The rejection of claim 13 is thereby traversed.

Claims 15-17 further define the novel method claimed in claim 14. For reasons set forth with respect to claim 14, the rejection of claims 15-17 is traversed.

New claims 19 and 20 which respectively depend from claim 18 further define the novel computer readable memory claimed in amended claim 18. Claims 19 and 20 claim features neither taught nor suggested in Morgenstern and Mitchell et al.

In view of the amendments made to the claims of this application and for reasons set forth above, this application is now considered to be in condition for immediate allowance. Favourable reconsideration and early issuance of a Notice of Allowance is requested.

Respectfully submitted,

Darin ELLIS et al

By John B. Hardaway, III

Registration No. 26,554 Attorney for Applicant

Date: 5 September 2000

Address: Nexsen Pruet Jacobs & Pollard

P.O. Drawer 10648

Greenville, SC 29603-0648 U.S.A.

A